

CLAIMS

I claim:

- [c1] 1. A galley cart for use on an aircraft, the galley cart comprising:
a body configured to be moved along a passenger aisle of the aircraft, the body including a one-piece plastic shell, the one-piece plastic shell forming a first side portion and at least one of a second side portion, a top portion, and a bottom portion of the body, wherein the first side portion is spaced apart from the second side portion, wherein the top portion extends between the first and second side portions, and wherein the bottom portion is spaced apart from the top portion and extends between the first and second side portions.
- [c2] 2. The galley cart of claim 1 wherein the one-piece plastic shell forms the first side portion, the top portion, and the second side portion of the body.
- [c3] 3. The galley cart of claim 1 wherein the one-piece plastic shell forms the first side portion, the top portion, the second side portion, and the bottom portion of the body.
- [c4] 4. The galley cart of claim 1 wherein the one-piece plastic shell includes an injection molded portion.
- [c5] 5. The galley cart of claim 1 wherein the one-piece plastic shell includes a rotational molded portion.
- [c6] 6. The galley cart of claim 1 wherein at least a portion of the one-piece plastic shell includes an inner skin offset from an outer skin in a double-wall configuration.

- [c7] 7. The galley cart of claim 1 wherein at least a portion of the one-piece plastic shell includes an inner skin offset from an outer skin in a double-wall configuration, and wherein the one-piece plastic shell further includes core material positioned between the inner and outer skins.
- [c8] 8. The galley cart of claim 1 wherein at least a portion of the one-piece plastic shell includes an inner skin offset from an outer skin in a double-wall configuration, wherein the one-piece plastic shell further includes a foam core positioned between the inner and outer skins, and wherein the inner and outer skins and the foam core are formed from the same material.
- [c9] 9. The galley cart of claim 1, further comprising a door with a cool air aperture positioned at least proximate to the body, wherein the cool air aperture is configured to let cool air from an exterior source flow into the body.
- [c10] 10. The galley cart of claim 1, further comprising a door hingeably attached to the body, wherein the door includes a cool air aperture configured to let cool air from an exterior source flow into the body.
- [c11] 11. The galley cart of claim 1, further comprising:
a door;
at least one insert molded into the one-piece plastic shell; and
at least one hinge engaged with the insert to pivotally attach the door to the one-piece plastic shell.
- [c12] 12. The galley cart of claim 1, further comprising:
a door;
a hinge attached to the door;
at least one threaded insert molded into the one-piece plastic shell; and

at least one fastener engaging the insert and attaching the hinge to the one-piece plastic shell to pivotally attach the door to the one-piece plastic shell.

[c13] 13. The galley cart of claim 1 wherein the one-piece plastic shell further includes an interior portion, the interior portion having a first interior side surface spaced apart from a second interior side surface, and a top interior surface spaced apart from a bottom interior surface, and wherein the galley cart further comprises at least one horizontal shelf extending from the first interior side surface to the second interior side surface between the top and bottom interior surfaces.

[c14] 14. The galley cart of claim 1 wherein the one-piece plastic shell further includes an interior portion, the interior portion having a first interior side surface spaced apart from a second interior side surface, and a top interior surface spaced apart from a bottom interior surface, and wherein the one-piece plastic shell additionally includes at least one horizontal shelf extending from the first interior side surface to the second interior side surface between the top and bottom interior surfaces.

[c15] 15. A galley cart for use on an aircraft, the galley cart comprising:
a body configured to be moved along a passenger aisle of the aircraft, the body including a one-piece plastic shell having an inner skin offset from an outer skin in a double-wall configuration, the one-piece plastic shell forming at least one of a first side portion, a second side portion, a top portion, and a bottom portion of the body, wherein the first side portion is spaced apart from the second side portion, wherein the top portion extends between the first and second side portions, and wherein the bottom portion is spaced apart from the top portion and extends between the first and second side portions.

- [c16] 16. The galley cart of claim 15 wherein the one-piece plastic shell further includes core material positioned between the inner and outer skins of the one-piece plastic shell.
- [c17] 17. The galley cart of claim 15 wherein the one-piece plastic shell further includes a foam core positioned between the inner and outer skins of the one-piece plastic shell.
- [c18] 18. The galley cart of claim 15 wherein the one-piece plastic shell further includes a foam core positioned between the inner and outer skins of the one-piece plastic shell, and wherein the inner and outer skins and the foam core are formed from the same material.
- [c19] 19. The galley cart of claim 15 wherein the one-piece plastic shell is a first one-piece plastic shell, and wherein the galley cart further comprises a second one-piece plastic shell at least partially forming a door hingeably attached to the body.
- [c20] 20. The galley cart of claim 15 wherein the one-piece plastic shell is a first one-piece plastic shell, wherein the galley cart further comprises a second one-piece plastic shell at least partially forming a door hingeably attached to the body, and wherein the second one-piece plastic shell includes an inner door skin offset from an outer door skin in a double-wall configuration.
- [c21] 21. The galley cart of claim 15 wherein the one-piece plastic shell is a first one-piece plastic shell, wherein the galley cart further comprises a second one-piece plastic shell at least partially forming a door hingeably attached to the body, and wherein the second one-piece plastic shell includes a cool air aperture configured to let cool air from an exterior source flow into the body.

[c22] 22. The galley cart of claim 21 wherein the cool air aperture is a first aperture, and wherein the second one-piece plastic shell further includes a second aperture configured to let air exit the body.

[c23] 23. The galley cart of claim 15, further comprising:
a door;
at least one insert molded into the one-piece plastic shell; and
at least one hinge pivotally attaching the door to the body by engagement of the insert.

[c24] 24. A galley cart for use with an aircraft, the galley cart comprising:
a one-piece plastic shell forming an interior portion having a plurality of horizontal supports configured to hold food, wherein the one-piece plastic shell includes an inner skin offset from an outer skin in a double-wall configuration;
at least one door hingeably attached to the one-piece plastic shell to provide access to the interior portion; and
a plurality of rollers positioned beneath the one-piece plastic shell for moving the one-piece plastic shell along a passenger aisle of an aircraft.

[c25] 25. The galley cart of claim 24 wherein the one-piece plastic shell includes at least one horizontal shelf having an inner skin offset from an outer skin in a double-wall configuration.

[c26] 26. The galley cart of claim 24 wherein the one-piece plastic shell further includes a foam core positioned between the inner and outer skins.

[c27] 27. The galley cart of claim 24 wherein the one-piece plastic shell further includes a foam core positioned between the inner and outer skins, and wherein

the inner skin, the outer skin, and the foam core are formed from the same material.

[c28] 28. The galley cart of claim 24 wherein the at least one door includes at least one cool air aperture configured to let cool air from an exterior source flow into the one-piece plastic shell.

[c29] 29. A method for manufacturing a galley cart for use on an aircraft, the method comprising:

loading plastic resin into a mold;

flowing the plastic resin over an interior surface of the mold to form a one-piece plastic shell, the one-piece plastic shell having an interior portion configured to support a plurality of airline meals;

removing the one-piece plastic shell from the mold; and

attaching a door to the one-piece plastic shell, wherein the door is movable to provide access to the interior portion of the one-piece plastic shell.

[c30] 30. The method of claim 29 wherein loading plastic resin into a mold includes injecting molten plastic resin into the mold.

[c31] 31. The method of claim 29, further comprising:

heating the resin; and

rotating the mold to flow the heated resin over the interior surface of the mold.

[c32] 32. The method of claim 29 wherein flowing the plastic resin over an interior surface of the mold includes forming a one-piece plastic shell having an inner skin offset from an outer skin in a double-wall configuration.

[c33] 33. The method of claim 29 wherein flowing the plastic resin over an interior surface of the mold includes forming a one-piece plastic shell having an inner skin offset from an outer skin in a double-wall configuration, and further forming a core material positioned between the inner and outer skins.

[c34] 34. The method of claim 29 wherein flowing the plastic resin over an interior surface of the mold includes forming a one-piece plastic shell having an inner skin offset from an outer skin in a double-wall configuration, and further forming a foam plastic core positioned between the inner and outer skins.

[c35] 35. The method of claim 29 wherein flowing the plastic resin over an interior surface of the mold to form a one-piece plastic shell includes forming a plurality of horizontal supports in the interior portion of the one-piece plastic shell, wherein the plurality of horizontal supports are configured to hold the plurality of airline meals.

[c36] 36. The method of claim 29 wherein the plastic resin includes a first portion of plastic resin, wherein the mold includes a first mold, wherein the one-piece plastic shell includes a first one-piece plastic shell, and wherein the method further comprises forming the door by:

loading a second portion of plastic resin into a second mold; and

flowing the second portion of plastic resin over an interior surface of the second mold to form a second one-piece plastic shell.

[c37] 37. The method of claim 29 wherein the plastic resin includes a first portion of plastic resin, wherein the mold includes a first mold, wherein the one-piece plastic shell includes a first one-piece plastic shell, and wherein the method further comprises forming the door by:

loading a second portion of plastic resin into a second mold; and

flowing the second portion of plastic resin over an interior surface of the second mold to form a second one-piece plastic shell having an inner door skin offset from an outer door skin in a double-wall configuration.

[c38] 38. The method of claim 29 wherein the plastic resin includes a first portion of plastic resin, wherein the mold includes a first mold, wherein the one-piece plastic shell includes a first one-piece plastic shell, and wherein the method further comprises forming the door by:

loading a second portion of plastic resin into a second mold; and

flowing the second portion of plastic resin over an interior surface of the second mold to form a second one-piece plastic shell having an aperture, wherein the aperture is configured to let cool air from an exterior source flow into the interior portion of the first one-piece plastic shell.

[c39] 39. The method of claim 29, further comprising loading at least one insert into the mold, wherein flowing the plastic resin over an interior surface of the mold includes fixing the insert in a portion of the one-piece plastic shell, and wherein attaching a door to the one-piece plastic shell includes engaging the insert.

[c40] 40. A food storage unit for use on an aircraft, the food storage unit comprising:

one-piece plastic means having an interior portion for holding food; and

roller means for moving the one-piece plastic means along a passenger aisle on an aircraft.

[c41] 41. The food storage unit of claim 40, further comprising insulating means for maintaining the temperature in the interior portion of the one-piece plastic means.

[c42] 42. The food storage unit of claim 40 wherein the one-piece plastic means includes double-wall means for holding insulating means therebetween.